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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/750,123	12/29/2003	Robert Burnett	139195	9801
24587	7590	09/18/2007	EXAMINER	
ALCATEL LUCENT INTELLECTUAL PROPERTY & STANDARDS 3400 W. PLANO PARKWAY, MS LEGL2 PLANO, TX 75075			PASCAL, LESLIE C	
			ART UNIT	PAPER NUMBER
			2613	
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			09/18/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>
	10/750,123	BURNETT ET AL.
	<b>Examiner</b>	<b>Art Unit</b>
	Leslie Pascal	2613

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 07 August 2007.
- 2a) This action is **FINAL**.                  2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 1,2 and 4-27 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) Claim(s) \_\_\_\_\_ is/are allowed.
- 6) Claim(s) 1-2 4-27 is/are rejected.
- 7) Claim(s) \_\_\_\_\_ is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 29 December 2003 is/are: a) accepted or b) objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All    b) Some \* c) None of:
1. Certified copies of the priority documents have been received.
  2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                     | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____.                                     |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____.   | 6) <input type="checkbox"/> Other: _____.                         |

1. Based on recent case law, a new 112, second paragraph rejection has been added. Applicant should see Biomedino, LLC v Water Techs. Corp., 490 F.3d 946, 83 USPQ2d 1118 (Fed. Cir. June 18, 2007). 75 USPQ2d 1116 and Default Proof Credit Card System Inc. v. Home Depot U.S.A. Inc., 75 USPQ2d 1116 (Fed. Cir. 2005)
2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 1-2 and 4-27 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Applicant should see Biomedino, LLC v Water Techs. Corp., 490 F.3d 946, 83 USPQ2d 1118 (Fed. Cir. June 18, 2007). 75 USPQ2d 1116 and Default Proof Credit Card System Inc. v. Home Depot U.S.A. Inc., 75 USPQ2d 1116 (Fed. Cir. 2005)  
As in the above case law, the claims are vague and indefinite because the applicants' specification does not include any structure corresponding to the means plus function language. Although the applicant uses means plus function language (in claims 10 and 18, in particular), such language must be backed in the specification by "some structure which performs the particular function" even if one of ordinary skill in the art could implement the structure even without the disclosure. "A bare statement that known techniques or methods can be used does not disclose structure. To conclude otherwise would vitiate the language of the statute requiring "corresponding structure, material, or acts described in the specification"" . claim 1 has a similar problem, in that it claims a method of using a structure. The structure which performs the function (method) is not ever disclosed. The applicant argues that one of ordinary skill in the art would know how to make this, but the case law says that even if one of ordinary skill could implement the structure, it must be backed in the specification.

4. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention

Claims 1-2 and 4-27 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter. See MPEP 2106.01. As stated in

the previous office TWO action, "The specification does not teach specific means that generate a first and second topology map or even specific means to forward and update the maps. It almost appears that the applicant feels that all nodes inherently have means to provide these functions, since such means are not specifically disclosed." In view of the applicants' arguments that a process is clearly disclosed, see MPEP 2106.01. The process claimed is considered to be "functional descriptive material" (i.e. a computer program). This section of the MPEP makes it clear that the functional description will only be statutory if it is structurally and functionally related to a computer readable medium. The applicant has never disclosed or claimed this. This section of the MPEP says that computer programs impart functionality ONLY when employed as a computer component. The addition of computer readable medium to the specification and claims will be new matter.

5. Claims 1-2 and 4-27 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

The specification does not teach specific means that generate a first and second topology map or even specific means to forward and update the maps. It almost appears that the applicant feels that all nodes inherently have means to provide these functions, since such means are not specifically disclosed.

In addition to not specifically describing how the “craft” retrieves the information.

It is also unclear how this is accomplished. It is unclear how the “craft” retrieves this information and WHAT an NOC 228 is.

6. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the means for generating the first topology map and means for generating a second topology maps and means for forwarding the maps and means for updating of claim 10 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as “amended.” If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either “Replacement Sheet” or “New Sheet” pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

8. Claims 1-2 and 4-27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ramaswami et al (5781537) in view of Wu et al (2002/0178186).

This rejection is based on the applicants' arguments, which appear to say that nodes inherently provide the functions of generating, forwarding, updating and determining pass-through wavelengths (since the applicant has not disclosed means to provide such processes and argues that his specification, which only discloses nodes, provides such process.

Ramaswami et al teach generating a wavelength topology table (figure 3) and forwarding and updating the tables at each node (column 7, lines 29-60). Although he does not specifically teach determining a topology map in a first direction and a second direction, it would have been obvious to do that since the information about all required wavelengths is sent in the topology map to all adjacent nodes. Further, it teaches that the update message that is sent lists the adjacent up links to the node and their wavelength usage. Since all information with regard to a certain direction are sent to each adjacent node, it would have been obvious to send only information that would affect each node only in order to save memory at each node by sending non relevant information to each node. Although he does not teach specifics about how the map is sent, Wu et al teaches that it is well known to use either in-band or out-of-band

wavelengths as the control channel (paragraph 8) in a system that sends forwarding tables (paragraph 20). It would have been obvious to use a dedicated channel, which is an out-of-band wavelength in order to send updating tables as taught by Wu et al. In regard to determining the pass through, see the last full paragraph of column 7 of Ramaswami et al. It says that each node determines all of the wavelengths that go through it (pass through it). In regard to forwarding OAM&P information, it would have been obvious to send such information over a control channel. Much of what is claimed, the applicants' specification does not teach details of. It appears from this that the applicant feels that such is so well known that they do not disclose how it is done. The applicant only discloses that OAM&P data is sent, not how it is sent. In regard to claims 7-9, 15-17, 21-22 and 25-27, based on the applicants' arguments that it is well known for craft people and NOCs to use such information, it would have been obvious in the system of Ramaswami and Wu. Further it would be obvious for such information to "indicate how such elements effect each other". See also MPEP 2111.04. It says that claim scope is not limited if it merely recites a use without any active, positive steps delimiting how this use is actually practiced. The applicants' claims do not relate to the last portion of this section because the applicants' claims do not CLEARLY recite the step of utilizing a device as in *Ex Parte Porter*, but of using something in order to provide a result without setting forth steps to provide the intended result. See also MPEP 2111.04. There are no positive steps carried out, just intended results.

Art Unit: 2613

9. In regard to the applicants' arguments of 8-7-07, the applicant points to portions of 2106 that are not related to a computer program. The issues in this case are that 1) the applicant claims specific means that are never disclosed and 2) that the method claimed must be provided by some type of processing means. The processing means (or any other specific means) are not disclosed by the applicant. The only means disclosed by the applicant are "network elements". In order for such network elements to provide the functions claimed, there must be processing means (to provide the generation of the topology maps, forwarding of the maps and updating) and memory means (to update the maps) that inherently provide these functions. It is NOT inherent that network elements have means to generate topology maps and forward and update topology maps. If it is, then the applicant has not claimed anything novel. If it is not inherent, than the applicant has not disclosed means that provide the function. This is shown by the fact that the applicant CLAIMS separate elements that are not shown in the drawings. In claim 10, specific means are claimed (means for generating, means for forwarding and means responsive to messaging for updating). Yet none of these means are shown or described. In the applicants' arguments with regard to the section of the MPEP 2106.01 which was cited by the examiner, the applicant quoted part of this section. Yet the relevant portion of this section of MPEP 2106.01 is cited below:

Since a computer program is merely a set of instructions capable of being executed by a computer, the computer program itself is not a process and USPTO personnel should treat a claim for a computer program, without the computer-readable medium needed to realize the computer program's functionality, as nonstatutory functional descriptive material. When a computer program is claimed in a process where the computer is executing the computer program's instructions, USPTO personnel should treat the claim as a process claim. See paragraph IV.B.2(b), below. When a computer program is recited in conjunction with a physical structure, such as a computer memory, USPTO personnel should treat the claim as a product claim. See paragraph IV.B.2(a), below.

this section makes it clear that a program must be provided by a computer in order to be statutory. There is no computer. There is no processor. there is no memory means disclosed. As stated in the previous office action, if a network element inherently provides these functions, the applicant is not claiming anything novel. If it is not inherent that a network element has these elements, the applicant has not disclosed means to provide the function. If the applicant does not have some type of processor means as taught in the quoted section of 2106.01, the program is non statutory. In regard to the applicants' arguments that paragraphs 19-25 clearly disclose the means required for the method of claim 1 and the means of claim 10, the only MEANS disclosed is a network element. There is no means that generates topology maps unless network elements inherently do this. This is something that a processor does. The applicant has not shown or disclosed this.

Figure 3 shows the steps of a program. There is no processor which provides these steps.

Art Unit: 2613

The applicant argues that all claimed subject matter is shown. Claim 10 SPECIFICALLY CLAIMS 1) two means for generating, 2) two means for forwarding 3) means responsive to messaging for updating. NONE OF THESE MEANS ARE SHOWN.

The applicant argues that one of ordinary skill would know how a "craft" retrieves information and what a NOC is. It appears that the applicant is arguing that it is so well known that he did not have to teach details. That appears to say that it is so well known that he did not have to describe it.

In regard to the applicants' arguments that there is not a 112, first paragraph problem because the specification "clearly describes the process of using the invention", this argument is not persuasive. For example, the specification NEVER TEACHES any means that the applicant uses to provide the process. One of ordinary skill in the art would not know how to make the invention as disclosed. The claims clearly recite updating (storing?); yet do not disclose means to update (store?). The claims recite determining pass-through wavelengths; yet never disclose means to provide this function. The claims recite generating topology maps; yet never disclose means that provide the generating function. It appears that the applicant feels that all nodes inherently provide these functions. If this is the case, nothing claimed is novel. The applicant MUST disclose what means provide the process claimed. There is no determining, generating, updating, storage means disclosed, nor is there processing means to provide the function. See also the 101 rejection.

In regard to the applicants' arguments with regard to claims 7-9, 15-17, 21-22 and 25-27, see MPEP 2111.04. It says that claim scope is not limited if it merely recites a use without any active, positive steps delimiting how this use is actually practiced. The applicants' claims do not relate to the last portion of this section because the applicants' claims do not CLEARLY recite the step of utilizing a device as in *Ex Parte Porter*, but of using something in order to provide a result without setting forth steps to provide the intended result. See also MPEP 2111.04. The applicant does not have clear method steps. Nor does he have specific means to provide a function.

In regard to the applicants' arguments with regard to the art rejection, if the applicants' means (I e nodes) can provide such a function, it would appear that the prior art (I e nodes) also can provide the function.

The applicant argues that Ramaswami et al teach that the controller updates the switch. Ramaswami et al's node includes the switch and controller and element 201. the network element would be considered to be elements 201-203. in that Ramaswami et al teach a controller at each node, it clearly updates and he teaches forwarding (column 12 under "the code". See step E4. Not only does Ramaswami et al teach updating and forwarding, Wu also does. Wu was used to teach the out-of-band signals.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Leslie Pascal whose telephone number is 571-272-3032. The examiner can normally be reached on Monday- Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jason Chan can be reached on 571-272-3022. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Leslie Pascal

Primary Examiner

Art Unit 2613